IMPORTANT

READ THIS BOOK BEFORE USING THE FIREARM

INSTRUCTION BOOK
Model 522 Viper
22 Caliber Rimfire
Autoloading Rifle

Remington

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MODEL 522 VIPER AUTOLOADING RIMFIRE RIFLE

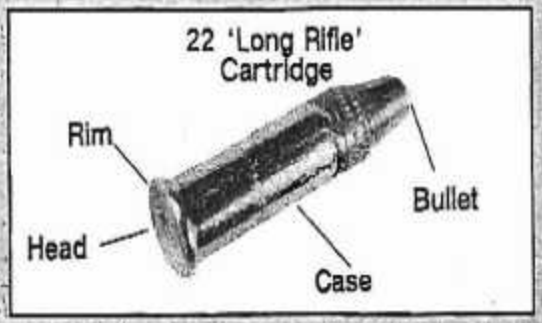
Congratulations on your choice of a Remington. With proper care, it should give you many years of dependable use and enjoyment.

For best results, we recommend that you use **Remington Ammunition** - the ammunition used in factory testing your firearm against our exacting function and performance standards.

Picture 1

This picture shows the main parts of the REMINGTON MODEL 522 VIPER AUTOLOADING RIMFIRE RIFLE. The picture will aid in understanding the instructions in this book.

Picture 2
Ammunition



This picture shows the parts of the ammunition.

SAFETY RULES

WARNING
READ THESE BASIC SAFETY RULES. Learn how to handle your firearm safely. Failure to read, understand and obey these rules can result in serious personal injuries. Only you can prevent accidents.

KNOW YOUR FIREARM. To use it correctly and safely, read and follow the instructions in the enclosed firearm safety booklet and this instruction book. Copies are available free on request from Remington Arms Company, Inc.

TREAT EVERY FIREARM AS IF IT WERE LOADED. Don't rely on the safety switch. Use it as shown in this book. Even when the safety switch is engaged, careless handling can cause the firearm to fire. The safety switch may not actually be engaged; the internal mechanism may be altered, disabled or broken; or the safety switch may have become disengaged by careless handling of the firearm.

NEVER MAKE ADJUSTMENTS. Do not make changes or alterations to any parts of a firearm. Use only REMINGTON parts. Never make an adjustment to the trigger, or change the shape or size of the sear, sear notch, or other parts.

MAKE YOURSELF SAFE. Wear eye protection, such as eyeglasses, shooting glasses or sunglasses, when shooting. Wear ear protection, such as ear plugs or muffs, when target shooting or plinking. Repeated exposure to shooting noise can cause permanent hearing loss. The rare ruptured case or firearm malfunction may damage hearing or vision. Never shoot when your ability is impaired by alcohol or medication.

TAKE CARE OF YOUR FIREARM. Keep the barrel clean and free of obstructions. Clean and have the firearm checked periodically to make sure it is mechanically correct. Worn, damaged or missing parts may be dangerous.

WATCH YOUR MUZZLE. Always keep the firearm pointed in a safe direction.

SAFETY RULES

NEVER USE THE WRONG AMMUNITION. Only use ammunition that exactly matches the caliber or gauge markings on your firearm. Careless or incorrect handloading is dangerous. Improperly-made handloads may cause the barrel or breech of any hand-held firearm to burst, which can result in serious personal injury.

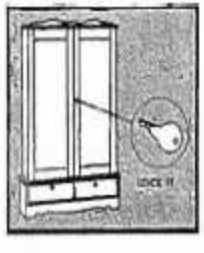
LOAD YOUR FIREARM SAFELY. Never load a firearm until you are in a location where it is safe to shoot, and you are ready to shoot.

KNOW YOUR TARGET. Before you pull the trigger, make sure you can see the target clearly, and the path of the bullet, slug, or shot charge beyond the target. Never shoot at water, rocks, or any hard surface. Bullets may glance off such surfaces and cause injuries.

KNOW THE RANGE OF YOUR FIREARM. Remember, shotgun pellets can travel 500 yards and shotgun slugs have a range of more than one-half mile. Rimfire bullets can travel more than 1 1/2 miles. Centerfire bullets can travel up to 5 miles.

IF FIREARM FAILS TO FIRE keep it pointed in a safe direction, then unload carefully avoiding exposure to breech. If firearm fires but report or recoil seems weak, unload and then make sure the barrel is not obstructed.

UNLOAD YOUR FIREARM WHENEVER YOU ARE NOT SHOOTING. Never carry or store a loaded firearm in a building or a vehicle. Unload your firearm before crossing or climbing up or down any obstacle that may prevent you from keeping full control over the firearm, such as a fallen tree, fence, tree stand, or slippery area.



STORE YOUR FIREARM SAFELY. Keep firearms and ammunition away from children. Lock unloaded firearms and ammunition securely in separate locations.

WARNING: Discharging firearms in poorly ventilated areas, cleaning firearms, or handling ammunition may result in exposure to lead, a substance known to cause birth defects, reproductive harm, and other serious physical injury. Have adequate ventilation at all times. Wash hands thoroughly after exposure.

IMPORTANT PARTS OF THE FIREARM

THE SAFETY SWITCH

The safety switch on the Model 522 Viper Autoloading Rimfire Rifle is a button located in front of the trigger. See Pictures 3 and 4.

The safety switch provides protection against accidental or unintentional discharge under normal usage when properly engaged and in good working order.

To engage the safety switch, push the button so the RED BAND MARKING CANNOT BE SEEN.

Always engage the safety switch when the firearm is loaded and you do not intend to shoot.

Never pull the trigger when the safety switch is engaged.

When you are ready to fire the firearm, the magazine must be in place. Press the safety switch so that the RED BAND MARKING IS SHOWING.

Do not touch the trigger while moving the safety switch.

WARNING: The firearm will fire when the trigger is pulled and the RED BAND IS SHOWING.

Even when the safety switch is engaged, careless handling can cause the firearm to fire. See Safety Rules on Page 2.

Picture 3

Picture 4

THE OPERATING HANDLE

The operating handle has two (2) functions:

1. It is used to pull the bolt rearward to open the action. See Picture 5.
2. The operating handle is also used to lock the bolt in the open position.

TO LOCK THE BOLT OPEN:

1. Pull the operating handle rearward to open the action.
2. While pulling the operating handle rearward push inward on the operating handle.
3. The operating handle will seat into the bolt and lock the bolt in the manual open position.

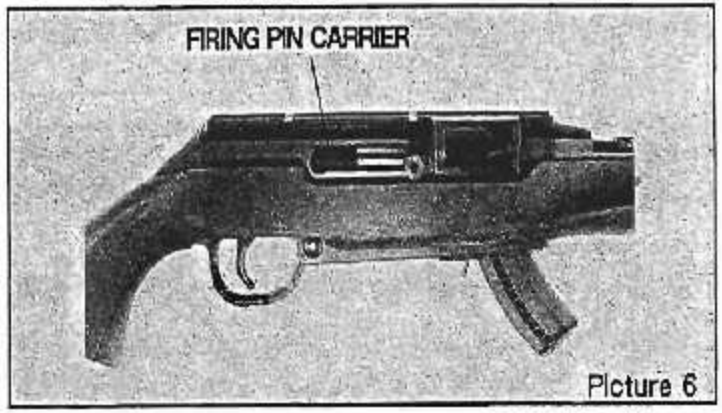
Picture 5

To unlock the bolt, pull outward on the operating handle and release.

WARNING: When the operating handle is forward and the bolt is closed, the firearm is ready to be fired.

TO REMOVE THE MAGAZINE:

1. Point the firearm in a safe direction.
2. Engage the safety switch. RED BAND WILL NOT SHOW.
3. Push the magazine latch rearward. See Picture 5.
4. Lock the bolt open.
5. Remove the magazine from the firearm.
6. Check the chamber to make sure it is empty.



Picture 6

WARNING: If you pick the firearm up and the RED firing pin carrier shows in the operating slot, there may have been a malfunction. See Picture 6.

1. Point the firearm in a safe direction.
2. Engage the safety switch. RED BAND WILL NOT SHOW.
3. Remove the magazine.
4. Pull the operating handle rearward to open the action.
5. Lock the bolt open.
6. Check the chamber to make sure it is empty.

THE TRIGGER ASSEMBLY

Pulling the trigger fires the firearm.

The trigger assembly and other parts of the firing mechanism are preset at the factory, and must never be altered or adjusted.

WARNING: NEVER put your finger on the trigger unless you are going to fire the firearm.

THE BARREL:

The inside of the barrel must be clean and free of obstructions.

I TO CHECK THE INSIDE OF THE BARREL:

1. Point the firearm in a safe direction.
2. Engage the safety switch. Make sure the RED BAND IS NOT SHOWING.
3. Pull the operating handle rearward and push it in to lock the bolt open.
4. Remove the magazine from the firearm.
5. Check the chamber to make sure it is empty.
6. Insert a cleaning rod into the muzzle. Push the rod completely through the barrel until the rod can be seen in the ejection port.

II TO REMOVE OBJECT FROM INSIDE THE BARREL:

WARNING: Never try to remove an object from the barrel by loading another cartridge and firing. This may cause the barrel to burst or a cartridge case to rupture and cause serious personal injury.

1. Use the correct size cleaning rod.
2. Insert the cleaning rod into the muzzle and lightly tap rod to free object.
3. Push the cleaning rod all the way through the barrel, until the rod can be seen in the ejection port.
4. If an object cannot be easily pushed out of the barrel with a cleaning rod, return the firearm to the factory or a REMINGTON RECOMMENDED GUNSMITH.

III TO CLEAN THE BARREL FOLLOW INSTRUCTIONS SHOWN ON PAGE 10.

BEFORE LOADING THE FIREARM:

Make sure the inside of the barrel is free of dirt or other objects.

TO LOAD THE FIREARM

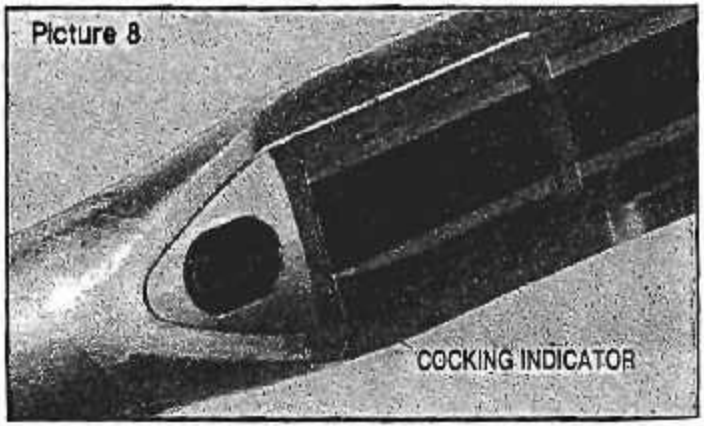
WARNING: This firearm is designed to use 22 'Long Rifle' cartridges only. Do not use any other 22 caliber ammunition, as this can cause a jam or severe gun malfunction and result in serious personal injury.

TO LOAD THE CHAMBER AND MAGAZINE:

NOTE: The barrel should be cleaned before loading and firing the firearm the first time. Follow cleaning instructions shown on Page 10.

1. Point the firearm in a safe direction.
2. Engage the safety switch. RED BAND WILL NOT SHOW.
3. Pull the operating handle rearward and push it in to lock the bolt in the open position.

4. Push the magazine latch rearward.
5. Pull the magazine from the bottom of the firearm.
6. Push the magazine follower button down. See Picture 7.
7. Push up to ten 22 'Long Rifle' cartridges one at a time into the magazine. Keep the bullets aligned toward the chamber. See Picture 7.
8. Replace the magazine into the firearm.
9. Make sure the magazine is fully latched into position.
10. Pull outward on the operating handle to unlock the bolt.
11. Release the operating handle. The bolt will close and feed the first cartridge into the chamber. The firearm is now cocked, with the safety switch engaged and the RED BAND NOT SHOWING. The red cocking indicator is clearly visible in the recess at the top rear of the receiver. See Picture 8.



THE CHAMBER AND MAGAZINE ARE NOW FULLY LOADED.

12. To fire the firearm, disengage the safety switch. RED BAND WILL SHOW.

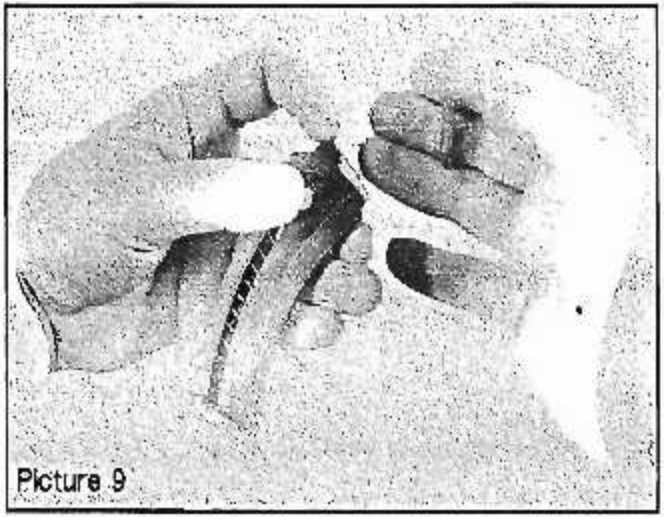
    THE FIREARM IS READY TO FIRE.

13. The firearm will fire each time the trigger is pulled until the magazine and chamber are empty.
14. The bolt will remain open after the last cartridge has been fired.

TO UNLOAD THE FIREARM:

1. Point the firearm in a safe direction.
2. Engage the safety switch. RED BAND WILL NOT SHOW.
3. Push the magazine latch rearward and remove the magazine from the firearm.
4. Pull the operating handle rearward to remove the cartridge from the chamber.
5. Continue to pull the operating handle rearward and push it in to lock the bolt open.
6. Slide the cartridges forward and out of the magazine. See Picture 9.
7. The magazine may be placed back into the firearm. If the magazine is NOT in the firearm, the magazine disconnect will prevent the firearm from firing.

WARNING: Check the chamber and the magazine to make sure there are no cartridges in the firearm.

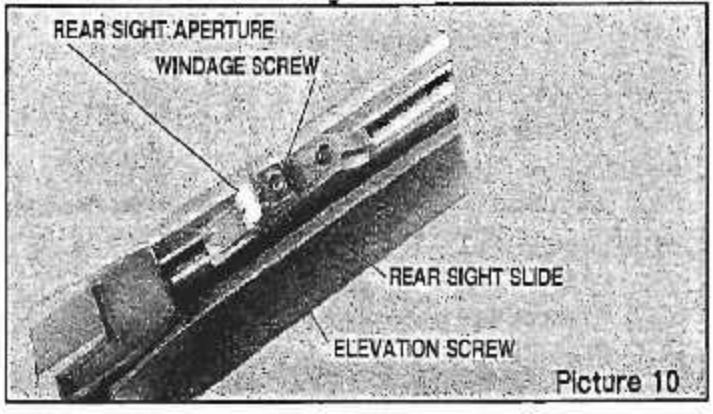


Picture 9

TO ADJUST THE SIGHTS

TO ADJUST THE REAR SIGHT

Move the rear sight in the same direction as you need to move the bullet on the target.



Picture 10

NOTE: For more information on ballistics and trajectory, see the REMINGTON catalog.

TELESCOPIC SIGHTS

The top of the receiver has a scope rail for the installation of telescopic sights.

POSITION ON TARGET	ADJUSTMENTS
Bullet hits above the center.	a. Loosen the elevation screw on the rear sight. b. Slide the rear sight down (backward) on the ramp. c. Tighten the elevation screw.
Bullet hits below the center.	a. Loosen the elevation screw on the rear sight. b. Slide the rear sight up (forward) on the ramp. c. Tighten the elevation screw.
Bullet hits to the left.	a. Loosen the windage screw on the rear sight ramp. b. Slide the rear sight aperture to the right. c. Tighten the windage screw.
Bullet hits to the right.	a. Loosen the windage screw on the rear sight. b. Slide the rear sight aperture to the left. c. Tighten the windage screw.

CLEANING, LUBRICATION AND MAINTENANCE

WARNING: This firearm should be checked periodically by the Remington Arms Company, Inc., or a REMINGTON RECOMMENDED GUNSMITH. This will insure proper inspection and any necessary replacement of worn or damaged parts.

NOTE: The chamber and bore should be cleaned before loading and firing the firearm the first time.

LUBRICATION:
Over-lubrication should be avoided at all times. A thin coat of Rem™ Oil helps to prevent rusting. See note below .

WARNING: Excessive use of a non-recommended lubricant could cause serious function problems possibly leading to accidental firing.

When the firearm is to be stored, it should be carefully cleaned and thoroughly oiled. Outside surfaces should be wiped with a light coat of Rem™ Oil occasionally.

When the firearm is to be reused, all excess lubrication must be removed. The chamber and bore must be thoroughly wiped dry.

The chamber and action must be cleaned periodically to prevent a misfire or gun malfunction.

NOTE: Remington Rem™ Oil with DuPont Teflon® Lubricant is available from your local dealer. If your dealer is out of stock, ask him to order Rem™ Oil from his Remington distributor.

TO CLEAN THE BARREL:

WARNING: Check the chamber and magazine to make sure there are no cartridges in the firearm.

NOTE: Open the action, lock the bolt open, and remove the magazine from the firearm.

1. Use the instructions and equipment provided in a good cleaning kit. For recommendations, see your dealer or Remington Authorized Gunsmith.
2. Select the correct caliber cleaning brush and attach the brush to the cleaning rod.
3. Put the cleaning brush into gun cleaning solvent.
4. Push the cleaning rod through the barrel several times.
5. Remove the brush from the rod, attach tip with cleaning patch, and push through the bore.
6. Repeat several times, using a new cleaning patch each time until the patch is clean.

WARNING: After cleaning, make sure the barrel is free of obstructions.

TO DISASSEMBLE THE FIREARM FOR CLEANING

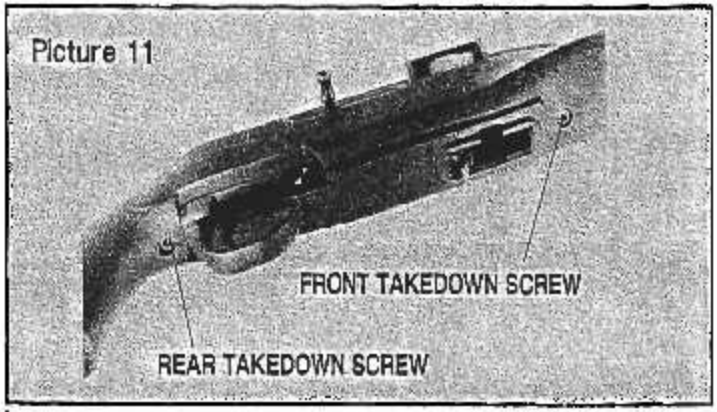
CAUTION: The Model 522 Viper rifle should not be disassembled beyond what is described in this instruction book, except by a qualified gunsmith.

TO DISASSEMBLE THE FIREARM FOR CLEANING:

WARNING: Check the chamber and magazine to make sure there are no cartridges in the firearm. Always wear eye protection when disassembling and reassembling the firearm.

1. Engage the safety switch. RED BAND WILL NOT SHOW.
2. Pull the operating handle rearward and push it in to lock the bolt open.
3. Push the magazine latch rearward and remove the magazine from the firearm.
4. Remove the front and rear takedown screws, using a 1/8" Allen Wrench. See Picture 11.

Picture 11



5. Lift and remove the action from the stock.

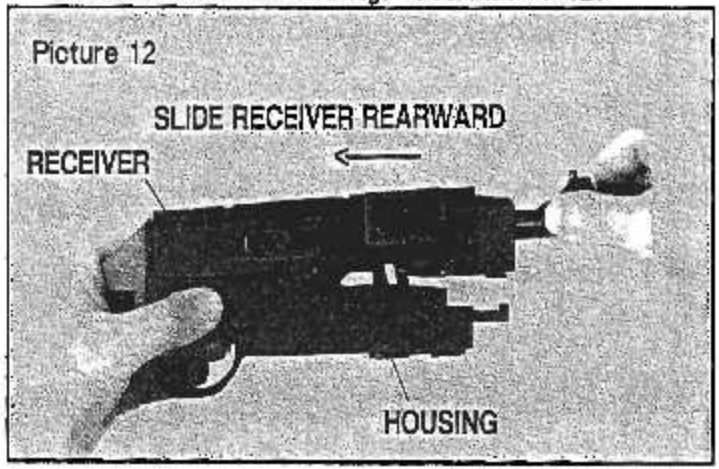
NOTE: The action has two (2) major parts, the receiver and the housing.

6. Slide the receiver rearward slightly to disengage it from the housing. See Picture 12.

WARNING: Use extreme care when disassembling the receiver and housing as the bolt spring and firing pin spring are under tension. Wear eye protection to avoid serious personal injury.

7. Rotate the receiver upward and slowly separate the receiver from the housing. See Picture 12.

Picture 12



TO CLEAN THE RECEIVER/BARREL ASSSEMLY:

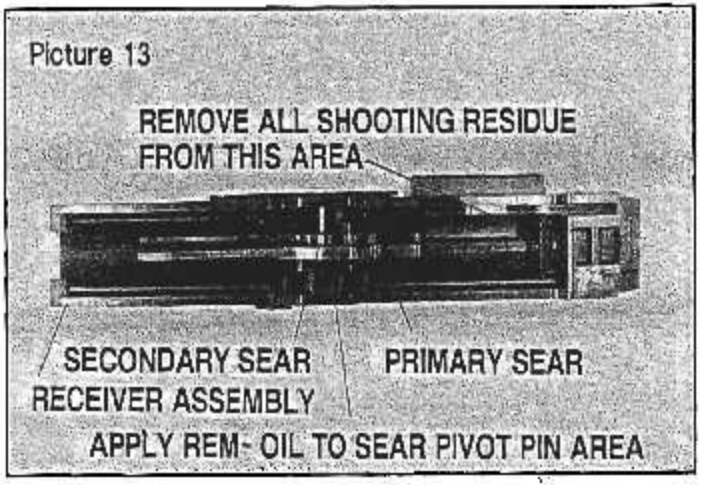
1. Remove the bolt spring and firing pin spring.
2. Slide the firing pin carrier assembly rearward and out of the receiver.
3. Unlock the operating handle and pull it fully rearward.
4. Pull the operating handle upward and out of the receiver.
5. Slide the breech bolt rearward and out of the receiver.

CAUTION: Do not disassemble further.

6. Brush the inside of the receiver and end of the barrel with gun cleaning solvent and wipe dry. See Picture 13.
7. Apply a thin coat of Rem™ Oil to the inside of the receiver and on the sear pivot pin. See Picture 13.

See Lubrication Warning on Page 10.

Picture 13

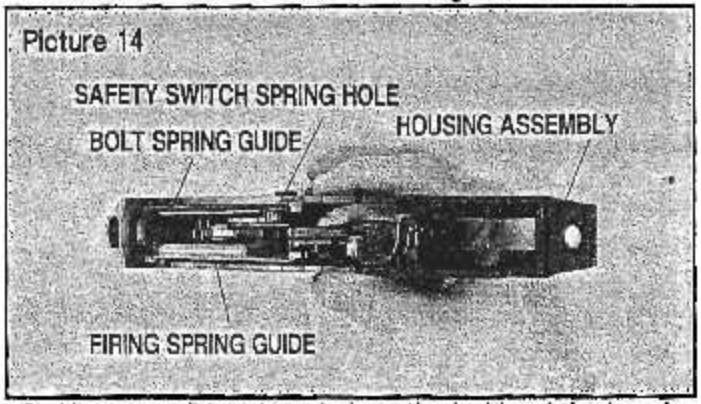

REMOVE ALL SHOOTING RESIDUE FROM THIS AREA
SECONDARY SEAR
PRIMARY SEAR
RECEIVER ASSEMBLY
APPLY REM- OIL TO SEAR PIVOT PIN AREA

TO CLEAN THE HOUSING ASSEMBLY:

CAUTION: Clean the housing as a unit using Rem™ Oil. Do not remove any parts from the housing except as stated below.

1. Slide the bolt spring guide and firing spring guide from the hub in the rear of the housing. See Picture 14.

Picture 14



2. Use a small brush and clean the inside of the housing thoroughly with cleaning solvent.
3. Use a clean patch or rag to wipe the housing clean and dry.
4. Apply a drop of Rem™ Oil to the trigger pivot pin area and safety switch spring hole. See Pictures 13 and 14.

TO CLEAN THE BREECH BOLT:

1. Clean the breech bolt using Rem™ Oil.
2. Clean the bolt including the bolt face and firing pin slot thoroughly and wipe dry.
3. Apply a drop of Rem™ Oil behind the extractor, and in the firing pin slot.

TO CLEAN THE FIRING PIN/CARRIER ASSEMBLY:

1. Clean the firing pin/carrier assembly with Rem™ Oil and wipe dry. See Lubrication Warning on Page 10.

TO CLEAN THE MAGAZINE ASSEMBLY:

WARNING: Check to make sure there are no cartridges in the magazine box.

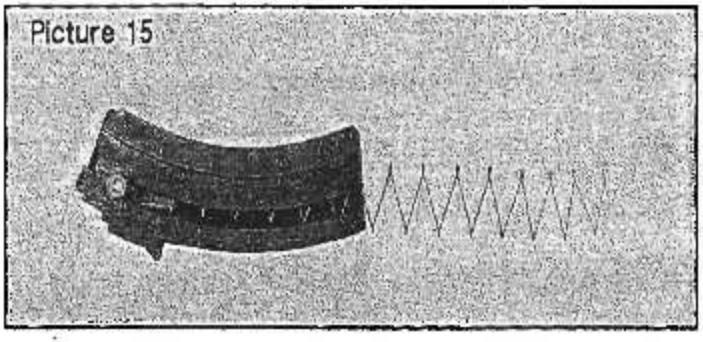
1. Slide the magazine bottom forward and off of the magazine. As the spring becomes exposed, hold it with your thumb to prevent it from flying out.

WARNING: Use extreme care when removing the magazine bottom, as the magazine spring is under tension. Wear eye protection to avoid serious personal injury.

2. Remove the magazine spring.
3. Remove the magazine follower.
4. Clean the magazine and follower and wipe dry.
5. Reassemble the magazine follower into the magazine. Align the button on the magazine follower with the slot in the magazine.
6. Insert the magazine spring into the magazine with the coils aligned as shown. See Picture 15.
7. Position the magazine bottom onto the magazine.
8. Push the magazine spring into the magazine and hold securely.
9. Slide the magazine bottom rearward until the spring end snaps into the slot in the side of the magazine bottom.

WARNING: This firearm should be checked periodically by the Remington Arms Co., Inc. or a REMINGTON RECOMMENDED GUNSMITH. This will insure proper inspection and any necessary replacement of worn or damaged parts.

Picture 15



TO REASSEMBLE THE FIREARM:

WARNING: Check the chamber and magazine box to make sure there are no cartridges in the firearm.

CAUTION: Do not reassemble the firearm with the magazine box in place.

I. RECEIVER/BARREL ASSEMBLY:

1. Slide the breech bolt into the receiver with the bolt face toward the barrel and the firing pin slot to the top so that it aligns with the rail in the top of the receiver.
2. Rotate both sears so they do not block the breech bolt.
3. Slide the bolt forward until the operating handle hole in the bolt aligns with operating handle slot in the receiver.

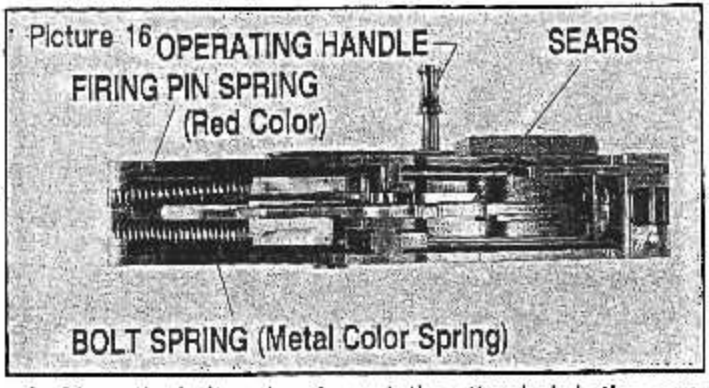
4. Insert the operating handle through the receiver and into the breech bolt.
5. Slide the breech bolt forward toward the barrel.

NOTE: Breech bolt must slide freely in the receiver with operating handle assembled.

6. Slide the firing pin/carrier assembly into the receiver making sure that the firing pin aligns with and enters the firing pin slot in the breech bolt.

NOTE: Rotate both sears so they do not block the firing pin/carrier assembly.

7. Place the firing pin spring into the hole on the operating handle side of the carrier. See Picture 16.



8. Place the bolt spring through the other hole in the carrier and into the breech bolt. See Picture 16.

NOTE: The firing pin spring is identified by RED color coded wire. This marks the spring to match the RED spring guide in the housing assembly and the RED firing pin carrier. When properly assembled, the springs will show approximately the same length.

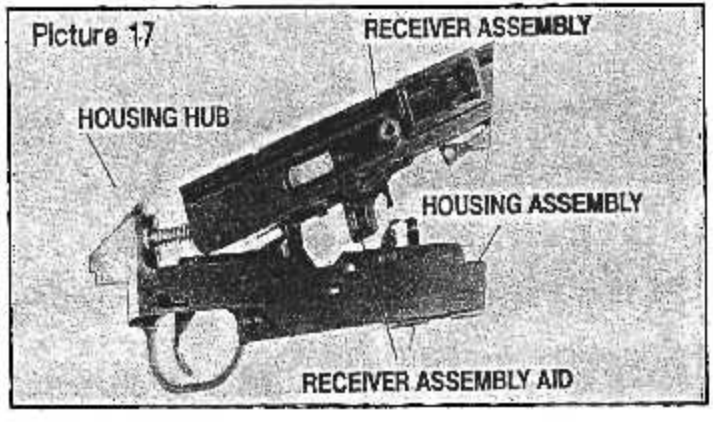
II HOUSING ASSEMBLY:

1. Place the RED spring guide into the slot in the right side of the hub at the rear of the housing.
2. Place the BLACK spring guide into the slot in the left side of the hub at the rear of the housing.

NOTE: If you try to insert the spring guides in reverse order you will notice that the spring guides are different and will not assemble properly in the wrong slots.

III RECEIVER AND HOUSING:

1. Align the receiver to the housing. Start the bolt spring and the firing pin spring onto the spring guides. See Picture 17.



NOTE: Remember the 3-R's. The RED spring goes on the RED spring guide in the RIGHT side of the receiver.

2. Slide the receiver rearward toward the housing until the rear of the receiver closes up on the hub on the housing.

NOTE: Start the receiver rearward at a slight angle to ensure that the sears clear the magazine guide and ejector. Use the receiver assembly aid to guide the receiver assembly into the housing assembly. See Picture 17.

CAUTION: If the receiver assembly aid is damaged or broken return the firearm to the factory or a REMINGTON RECOMMENDED GUNSMITH.

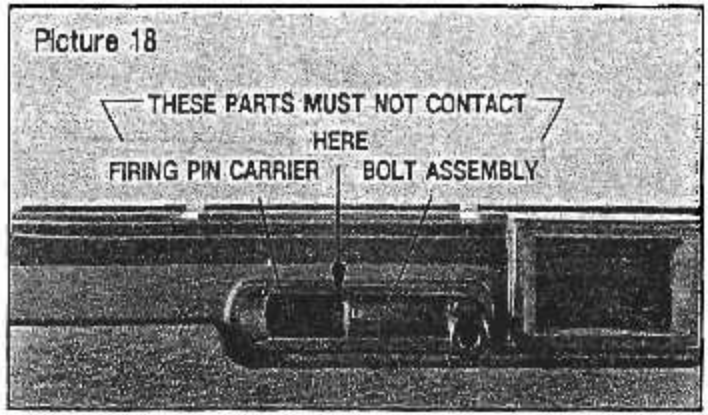
3. To ensure that the secondary sear is functioning properly pull operating handle rearward 1/4 inch and release the handle. The firing pin carrier, when properly assembled, WILL NOT contact the rear of the bolt assembly. See Picture 18.

4. The front of the receiver must lock into the notch in the housing. This will keep both assemblies together while you assemble the stock.

IV ACTION TO STOCK ASSEMBLY:

1. Assemble the action into the stock.

NOTE: The safety switch must be engaged. RED BAND WILL NOT SHOW.



2. Insert the front and rear takedown screws.

NOTE: Longer takedown screw goes to the back of the trigger guard.

3. Tighten both screws, using a 1/8" Allen Wrench, until both screws are snug. Do not over-tighten.
4. Pull the operating handle rearward and lock the bolt in the open position.
5. The magazine may be placed back into the firearm. If the magazine is NOT in the firearm, the magazine disconnect will prevent the firearm from firing.

HOW TO ORDER PARTS OR SERVICE FROM THE REMINGTON FACTORY

TO ORDER PARTS:

NOTE: Many Remington dealers carry a full line of parts.

1. Use the information on Pages 17 and 18 to find the correct part name and number.
2. Write the model and serial number of your firearm, and the part name and number on the parts order.
3. Send or fax parts order to:

   Arms Service Division
   Remington Arms Company, Inc.
   Ilion, New York 13357-1888

   Parts Department: 315-895-7493
   Parts Department Fax: 315-895-3659

4. When calling an order in, please have your Visa or Mastercard ready. If you wish to pre-pay by check or money order, an exact quote will be given to you over the phone.
5. Sorry, no C.O.D.'s.

WARNING: Use only Remington parts in Remington firearms.

TO ORDER FACTORY SERVICE:

1. Write a short description of the problem and include the model number, serial number and day time telephone number.
2. Attach a copy to the firearm and another in an envelope on the outside of the box.

WARNING: Make sure gun and magazine are unloaded before shipping.

3. Send by either United Parcel Service or Parcel Post. Ship magazine with the firearm.
4. Get insurance for the firearm.
5. Record the serial number. It is required when calling factory to inquire if firearm has been received for repairs.
6. Send firearms for factory service to:

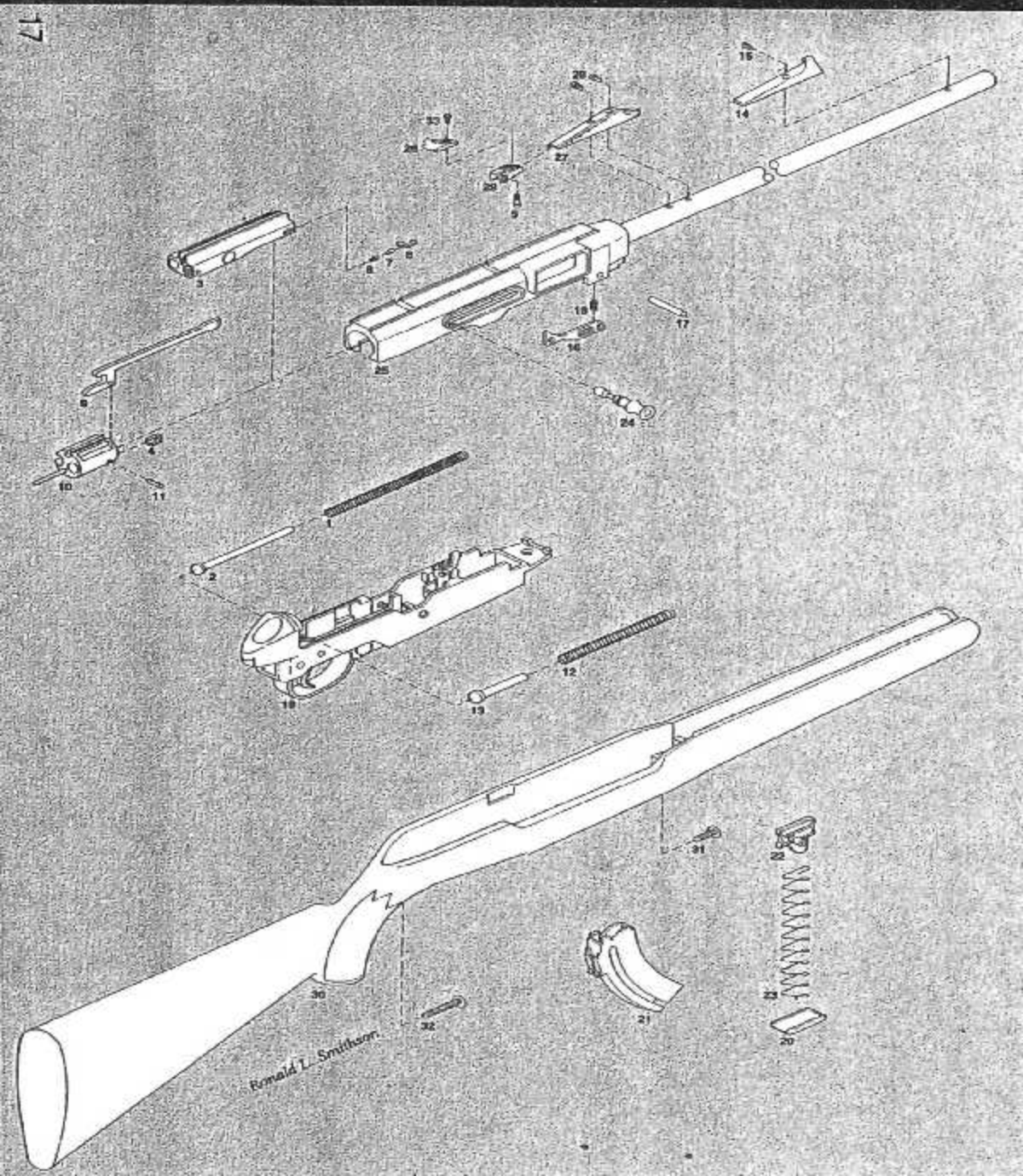
   Arms Service Division
   Remington Arms Company, Inc.
   Ilion, New York 13357-1888

   Service Department: 315-895-7791
   Service Department Fax: 315-895-3659

INSTRUCTION BOOKS AND GUNSMITH LIST:

To get an instruction book for any Remington firearm, a firearms safety booklet, and a list of recommended gunsmiths, write to Remington Arms Company, Inc., Arms Service Division, Ilion, New York 13357. Give the model, serial number, gauge or caliber.

MODEL 522 VIPER
22 CALIBER
AUTOLOADING RIFLE



MODEL 522 VIPER PARTS LIST

PARTS SUBJECT TO CHANGE WITHOUT NOTICE. FOB ILION, NEW YORK.

View No.	Part No.	Name
1	94964	Bolt Return Spring
2	94838	Bolt Spring Guide
	104205	Breech Bolt Assembly (Restricted)
3	104200	Breech Bolt (Restricted)
4	97275	Carrier Sear Stop (Restricted)
5	90906	Elevation Screw (Not Shown)
6	104830	Extractor
7	97039	Extractor Plunger
8	97418	Extractor Spring
9	97043	Firing Pin (Restricted)
10	97012	Firing Pin Carrier (Restricted)
	97020	Firing Pin Carrier Assembly
11	97019	Firing Pin Retaining Pin (Restricted)
12	94965	Firing Pin Spring
13	94839	Firing Pin Spring Guide
14	94927	Front Sight
15	28505	Front Sight Screw
16	94931	Hold Open
17	97050	Hold Open Retainer Pin
18	94933	Hold Open Return Spring
19	104240	Housing Assembly Complete (Restricted)
	104215	Magazine Assembly(10 Shot)
20	97441	Magazine Bottom
21	104445	Magazine Box
22	94972	Magazine Follower
23	94973	Magazine Spring
24	97716	Operating Handle
25	104185	Receiver/Barrel Assembly (Restricted)
26	97681	Rear Sight Aperture
	104165	Rear Sight Assembly
27	104160	Rear Sight Base
28	28505	Rear Sight Base Screw
29	93904	Rear Sight Slide
30	104210	Stock Assembly
31	97820	Takedown Screw, Front
32	97821	Takedown Screw, Rear
33	90904	Windage Screw (Not Shown)

NOTE: Restricted parts are for factory installation only.